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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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09/690,595

10/17/2000

Michael O. Okoroafor

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PPG INDUSTRIES INC
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EXAMINER

PENG, KUO LIANG

ART UNIT

PAPER NUMBER

1796

MAIL DATE

DELIVERY MODE

02/06/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

09/690,595

Applicant(s)

OKOROAFOR ET AL.

Examiner

Kuo-Liang Peng

Art Unit

1796

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 1/14/08 RCE.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 7-10, 12, 13, 24, 30-33, 36, 56-93, 96-97 is/are pending in the application.
- 4a) Of the above claim(s) 56-93, 96 and 97 is/are withdrawn from consideration.
- 5) ☐ Claim(s) 24 and 95 is/are allowed.
- 6) ☒ Claim(s) 7-10, 12, 13, 30, 32-33 and 36 is/are rejected.
- 7) ☒ Claim(s) 31 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on January 14, 2008 has been entered. Claims 1-6, 11, 14-23, 25-29, 34-35, 37-55 and 94 are deleted. Claims 7-10, 12, 30-33 and 36 are amended. Claims 56-93 and 96-97 are withdrawn. Now, Claims 7-10, 12-13, 24, 30-33, 36 and 95 are pending for consideration.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 32-33 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In Claim 32 (line 3), before "comprises", should there be -- further --?

In Claim 33 (line 2), before “comprises”, should there be -- further --?

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 7-10, 12-13, 30 and 36 are rejected under 35 U.S.C. 102(b) as being anticipated by Miranda (US 3 600 359).

Miranda discloses a polymerizate derived from a polymerizable organic composition comprising a acrylate monomer containing at least one acryloyl groups and thiourethane linkages as described in col. 2, line 28, wherein n is more than 1 (col. 2, lines 44-45), such as 2, 3, or 4 (col. 3, line 41). In addition to the acrylate monomer, Miranda further teaches the use of vinyl pyrrolidone which reads on Applicants' monoethylenically unsaturated monomer. Miranda further teaches that the acrylate monomer is prepared by reacting a polythiol monomer as described in col. 2, lines 14-27 where n is more than 1 (col. 2, lines 44-45), such as 2, 3, or 4 (col. 3, line 41) with a diisocyanate (col. 2, line 17). Miranda further

teaches the use of n moles of the diisocyanate to react with 1 mole of polythiol which containing n moles of thiol groups (col. 2, lines 14-16). Miranda further teaches the use of polythiols such as trimethylolpropane tris(mercaptopropionate), pentaerythritol tetrakis(mercaptopropionate), trimethylolpropanol tris(thioglycolate), etc. (col. 3, lines 20-43 and Examples).

6. Claims 7-10, 12-13, 30 and 36 are rejected under 35 U.S.C. 102(b) as anticipated by Kobayashi (US 5 916 987).

Kobayashi discloses a polymerizate derived from a composition comprising a sulfur-containing O-(meth)acrylate compound represented by formula (1) containing thiourethane linkages. (col. 2, line 1 to col. 3, line 7) The molar equivalent ratio of NCO/SH is exemplified in Examples. Isocyanate compounds containing one or more sulfur atoms in its backbone can be used. (col. 6, lines 8-34) Additives such as UV absorbers, anti-coloring agents, etc. can be used. (col. 9, lines 32-35) Polymerization initiators can be incorporated into the composition. (col. 8, lines 40-67) Articles such as lenses can be made of the polymerizate. (col. 9, lines 39-50) Polythiol compounds described in col. 7, line 62 to col. 8, line 19 can be present.

7. Claim 31 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

8. Claims 32-33 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

Allowable Subject Matter

9. Claims 24 and 95 are allowed.

10. The following is an examiner's statement of reasons for allowance:

The present claims are allowable for at least the following reason(s) over the closest references: Miranda (US 3 600 359) and Kobayashi (US 5 916 987)

None of Miranda and Kobayashi teaches or fairly suggests the claimed composition and polymerizate thereof.


11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kuo-Liang Peng whose telephone number is

(571) 272-1091. The examiner can normally be reached on Monday-Friday from 8:30 AM to 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jim Seidleck, can be reached on (571) 272-1078. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

klp
January 31, 2008


Kuo-Liang Peng
Primary Examiner
Art Unit 1796